



U.S. DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration
National Marine Sanctuary System
Stellwagen Bank National Marine Sanctuary
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18 SAC MINUTES

18th SANCTUARY ADVISORY COUNCIL MEETING
The Sheraton Colonial, Wakefield, MA
24 January 2006

MINUTES OF MEETING

PRESENT

Bill Adler	Member: Fixed Gear Commercial Fishing
Regina Asmutis-Silvia	(Alternate to Susan Farady—Conservation)
Edward Barrett	Member: Mobile Gear Commercial Fishing
Peter Borrelli	Member: Education
Priscilla Brooks	Member: Conservation
Dale Brown	(Alternate to Sally Yozell—At-Large)
Susan Farady	Member: Conservation
Barry Gibson	Member: Recreation
Chris Kellogg	(Alternate to Paul Howard) (Ex-Officio Member)
Martin McCabe	(Alternate to William Eldridge—Marine Transportation)
Steve Milliken	Member: Whale Watching
LT Paul Murphy	(Designee for RADM David Pekoske) (Ex-Officio Member)
Kathi Rodrigues	(Designee for Patricia Kurkul) (Ex-Officio Member)
Susan Snow-Cotter	(Ex-Officio Member)
Steven Tucker	(Alternate to Deborah Cramer—At-Large)
John Tulik	(Alternate to Kathleen Dolan—Ex-Officio)
Mason Weinrich	Member: Research
Dick Wheeler	Member: Education
John Williamson	Member: At-Large
Sally Yozell	Member: At-Large

SBNMS and NATIONAL PROGRAM STAFF

Craig MacDonald, Superintendent	Ben Cowie-Haskell	Nathalie Ward
Anne Smrcina		

OTHERS PRESENT

Theresa Barbo	Andrew Cooper U.N.H.	Timothy Feehan
Mary Jane McGlennon	RADM David Pekoske	Kate Smuckler
Bob Steneck		



I. Welcome, Review of Agenda and Approval of 17th SAC Minutes (John Williamson)

Welcome and Recognition

John Williamson opened the meeting and welcomed all members to the 18th Stellwagen Bank National Marine Sanctuary (SBNMS) Sanctuary Advisory Council (SAC) meeting. All in attendance were advised that this meeting was being recorded.

Review of Agenda

The agenda was reviewed and accepted by the SAC.

Approval of 17th SAC Minutes

The minutes of the 17th SAC Meeting were accepted by the SAC as presented.

II. Sanctuary Report (Craig MacDonald)

Management Plan Review (MPR) Update

Macdonald stated that the Stellwagen Bank (SB) Draft Management Plan (DMP) is a *non-regulatory* MP—a decision of the National Marine Sanctuary Program (NMSP). The SB DMP has the following components: the Site Characterization (SC), the Action Plans (APs), the Draft Environmental Assessment (DEA) and General Appendices.

Within the plan, suggestions for regulation are included —stated in terms such as “it is recommended that regulations be made to...” — in order to identify the potential regulations, and have the plan released in a timely manner. The actual regulatory process (Environmental Assessment) will commence after the MP is released. This action enables the plan to be released immediately after NOAA review; and, subsequently determine if a need exists to conduct a full Environmental Impact Statement (EIS) or change the Designation Document (DD).

There are three targeted management actions that contain ‘regulation recommendations’:

1) the Transportation Separation Scheme (TSS), 2) Maritime Heritage Resources (MHR), and, 3) Whale Watching. Possible recommendations concerning fishing have been tied to the Zoning (Z) Working Group (WG). To date, the ZG suggestions include more dialog with no recommendations for regulations on fishing within the sanctuary. MHR may suggest preserves around shipwrecks that could impact fishing.

The DRAFT Action Plans (AP) have been submitted to NMSP Headquarters. The APs have been altered slightly from the SAC’s review (October 2004) in order to combine recommendations that were overlapping between APs. In effect, the Working Group content remains the same. The SAC prioritized *activities* (November 2004); currently the sanctuary is prioritizing *strategies*. Prioritization will be dependant on cost effectiveness and timelines.

Currently, resources are being used to complete the site characterization section as well as the TSS, the MHR and the Whale Watch management actions. SBNMS will be conducting public scoping for the next MPR, commencing in 2010-2011. Upon submission of the complete MP document, NMSP Headquarters states that review turnaround should only be a few months.

Within the NMSP, regulatory MPs have delayed the process substantially. For example, the Channel Islands NMS *regulatory* MP was released for public comment in 2002. Subsequent public comment

lead to a full EIS, and internal review within the National Oceanic and Atmospheric Administration (NOAA).

Macdonald reiterated that although the MP timeline seems lengthy, this has been a self-defining process. This management plan will contain many non-regulatory recommendations. SAC members will have the opportunity to comment on the plan, both collectively and independently, when it is released for comment.

Comment: Peter Borrelli commented that the SAC should have the opportunity to review the management plan before being released for public comment. The process has been delayed and it is important to move ahead. The SAC should be allowed to comment and prioritize and not be put in the position to have to react when it is released for public comment.

LNG Update

Discussions concerning the proposed change to the TSS are ongoing. The SBNMS has worked with industry and Congress, and has their support. Industry is favoring the first TSS proposal from Dave Wiley. NOAA has been briefed. In March, the TSS proposal will be submitted to the U.S. Coast Guard (USCG); subsequently, it will be reviewed by the International Maritime Organization (IMO). NOAA's comments regarding the Liquefied Natural Gas (LNG) proposals captured the sanctuary's sentiments. An EIS is now required for the Deep Water Port Act. The sanctuary will be providing 'alternatives' for this process. The proposed TSS change will reduce the probability of ship strike to the greatest number of whales, but not necessarily right whales.

Comment: Mason Weinrich and Dale Brown provided information that the USCG has halted the process and the clock has stopped for the LNG proposals, due to lack of information provided by the companies. The USCG had released a letter, which was reported in the Gloucester Times. The companies are currently addressing their concerns and it is possible that the Excellerate clock may be starting again soon.

Comment: Mason Weinrich provided info that NE Gateway, which originally proposed using an 'open-loop system', was changing its proposal to use a 'closed-loop system'. It was noted that currently there are very few 'closed-loop system' ships in operation in the Atlantic.

Comment: Regina Asmutis-Silvia commented that a similar offshore station was developed in the Gulf of Mexico; it was shown to not be profitable. However, the high usage of LNG in the NE will make such systems profitable. More proposals for such facilities are expected in the Gulf of Maine region.

Condition Report: Update

Recommendations from the SAC concerning the Condition Report presented at the previous SAC meeting have been made available to NMSP Headquarters. Comments were well received by Headquarters. The essence of the SACs comments will be incorporated into the latest draft of the report.

This report is not subject to the Data Quality Act, however, as it is not providing actual data, just information based on observation. MacDonald noted that the report process is underway and will be institutionalized. Headquarters have not provided the latest revision for review. No conclusions have been changed in the report.

Comment: Mason Weinrich commented that he was not aware of the Condition Report or the request for comments on it. He requested that a list of motions be delivered to SAC members after each meeting to serve as a reminder of things that were agreed upon.

Comment: Barry Gibson commented that the Condition Report summary table makes conditions within the sanctuary look grim while all publications currently in circulation show a diverse and thriving area. He reiterated that there is disconnect in the published material, even if the Condition Report is based on observation.

Website Update

Anne Smrcina provided an update on the migration of information from the old website to the new website. She reported that the data migration was 75% complete. Sections still needed to be fixed. Within the next week, these sections would be checked and reviewed. After the verification process the site would go live. Once items are submitted, it should take only two to three days for the site to be up.

III. SBNMS Business (John Williamson)

Zoning (Z) Working Group (WG)

The Z WG has met two times. WG members have been working on the development of an operational definition of 'ecological integrity'. The WG has also moved to create a Technical Science Team to work on metrics to be used with zoning concepts to be utilized. The technical science team will meet sometime in February. The next meeting of the Z WG is tentatively set for March 2006.

Announcements

The following announcements were made during the 18th SAC Meeting.

SBNMS Friends Group

Craig MacDonald introduced Mary Jane McGlennon, from Gloucester MA, who is currently working to develop a local SBNMS Friends Group. Mary Jane McGlennon has experience with many non-profit organizations and served as head of the Development Office for the New England Aquarium. She requested that any interested SAC members meet with her as she is setting up an advisory group to start the Friends Group.

Recruitment—New SAC Members

Craig MacDonald welcomed new members to the SAC. Tim Moll will serve in the Business/Industry Seat and David Jenson will be his alternate. Tim Moll is the Vice-President of Brewer Plymouth Marine. David Jenson is from Marine Bay Boston Harbor. Jack Crowley is the Alternate for the Education seat (Peter Borelli is the Member). Jack Crowley is the Executive Director of Massachusetts Marine Educators. Many qualified applicants were reviewed for these positions and the final decision was difficult. The new members were confirmed by National Marine Sanctuary Program Headquarters on January 23. John Williamson added that, as requested by the SAC, the Executive Committee acted as the Review Board to assist in selection of the new members.

SAC Annual Report 2006

Nathalie Ward reminded the SAC that an annual report is written each year to report on sanctuary activities. The 2006 SAC Annual Report has been submitted and will be part of the National Report.

SAC Meetings 2006

The date for the next SAC meeting is:

- June 12, 2006

SAC Members suggested this date so as not to have conflict with the upcoming International Whaling Commission meeting. Members also suggested that the next meeting should correspond to the release of the Draft Management Plan.

Rear Admiral Pecoske (USCG)

Craig MacDonald introduced Rear Admiral Pecoske. The Admiral stated that he was a native New Englander and had familiarity with the area. Much of his current staff is also from the New England region. He wanted to re-assure everyone in that, despite the added Homeland Security mission, other missions of the USCG have been doing as well, or better, since 9/11. The budget has nearly doubled and the investment goes across the board. The Admiral thanked the SAC for the job it was doing and opened the floor for questions for him.

Questions & Answers:

Question 1: Ed Barrett asked if there was any possibility that a station in Scituate MA would be re-opened?

Answer: No, such a station would not be re-opened. The station is basically seasonal and doesn't need to exist. The mission is well supported by other stations in the area and by the many vessels working just offshore. It is really a network response if incidents occur. Towing responsibility has changed over to commercial providers and individual harbor masters.

Question 2: Ed Barrett stated that harbor masters differ in their expertise. The presence of trained personnel makes a big difference but this does not show up in statistics. What can be done about this?

Answer: The Admiral answered that any information concerning this issue would be welcome. Currently, the USCG was trying joint operations and training with harbor masters. There will be more of this type of training and this should improve what is being seen.

Comment: John Williamson stated that the SAC is made up of stake holders and folks with an interest of what goes on at sea. He wished to note that the USCG has done such a professional job that it is easy to take them for granted. On behalf of the SAC he wished to thank the USCG for their service.

Comment: Craig MacDonald added that he would like to make sure that sanctuary stayed prominent with the in-coming Admiral. So far, communication with the Admiral's office has been excellent and he wished to make the transition as easy as possible.

IV. Constituent Reports

SAVE Whales: A pilot program, which will develop Standby Assist Vessels for Entangled Whales as a means to increase the likelihood of disentangling large endangered whales coastal to Massachusetts.

Regina A. Asmutis¹ and David Morin²

¹Whale and Dolphin Conservation Society, 70 East Falmouth Highway, East Falmouth, MA 02536

²Provincetown Center for Coastal Studies, P.O. Box 1036, Provincetown, MA 02657

In 2004, the MET generously funded SAVE Whales. SAVE Whales was developed by the International Wildlife Coalition, in conjunction with the Provincetown Center for Coastal Studies (PCCS). It is a three year pilot project to develop and implement protocols to use commercial assistance vessels (CAV), such as Sea Tow, as rapid response standby vessels when entangled whales are reported in the initial program area. The program has proven successful. Operators from Sea Tow Boston and Sea Tow South Shore have been trained as Level Two responders in accordance with the Atlantic Large Whale Disentanglement Network protocols. On the two occasions when standby vessels were necessary, Sea Tow has immediately responded and stood by two entangled humpback whales in 2005. The MET has approved the utilization of existing funds to increase the scope of the SAVE Whales project to include responses to entangled sea turtles.

Right Whale Status (Regina A. Asmutis-Silvia)

With fewer than 350 North Atlantic right whales known to remain, the survival of each individual is vitally important to ensure the survival of this species. Since 1986, at least half of the known mortalities have resulted from human-induced causes including entanglements in fishing gear and ship strikes. Since January 2004 at least 11 right whale deaths have been reported and confirmed. These data are a minimum estimate of the actual impact, as they do not account for the numbers of animals that may have died at sea and gone undetected. At least six of these mortalities were linked to ship strikes and at least one to an entanglement. An additional animal is suspected to have died since being struck in March of 2005. At least eight of these animals were female; three of them were pregnant at the time of death. These data alone represent a loss of more than five percent of the total breeding population, adding yet more pressure to the species. NOAA Fisheries first proposed action to reduce the risk of strikes to right whales in November of 2004 but has yet set forward a rulemaking. A request for an emergency rule was put forward by a coalition of NGOs in May of 2005 but denied by NOAA Fisheries in Sept. of 2005. Additionally, the USCG has denied the endorsement of speed restrictions to protect right whales and denied a petition to establish an 'emergency safety zone' around Jacksonville, FL (right whale calving area). In the last 15 months (with no protective measures put forth by the NOAA Fisheries), there are 9 dead right whales resulting from human interaction with at least two additional strikes. As a result of these events, a coalition of NGOs has filed suit against the NOAA Fisheries and the USCG.

The SBNMS has indicated it may work with other Sanctuaries on specific issues. Right whales have been documented along the entire east coast and in the Gulf of Mexico. It would be timely to develop a regional sanctuary plan to protect this species as east coast sanctuaries are affected including the Florida Keys, Flower Garden, and Stellwagen Ban.

Questions & Answers

Question 1: John Williamson asked, What is the population estimate for right whales and how many calves are out there?

Answer: Regina Asmutis answered that there are approximately 294 individuals, but the number could be as high as 350. There are currently 9 calves and the current rate of decline is higher than the birth rate.

Comment: Mason Weinrich commented that there is a need to monitor whales when there are less eyes out there, such as off-season. Whales are showing up where they are not usually supposed to be. Currently, acoustic devices are being placed in New England waters to monitor whale activity.

Question 2: Steve Milliken asked, Why are there so many more females involved in incidents than males?

Answer: Regina Asmutis answered that females may just be more prevalent and easier to see. There may be many more males out there that are not seen. Right whales are being sighted in areas where they were not seen previously.

Comment: Peter Borrelli wondered if the sanctuary would consider 'emergency rule making.' A tremendous amount of money could be spent on monitoring but this effort will not necessarily reduce ship strike. She noted that speed kills, and there are vessels speeding through the sanctuary. Massachusetts has declared 'emergencies' in Cape Cod Bay with the presence of right whales, thereby reducing speed to 15 knots. He cautioned that there will be dead whales in the sanctuary due to ship strike due to speeding vessels at some point.

Peter Borrelli moved to recommend the SBNMS consult with appropriate agencies (NMFS/USCG) to examine the options to take emergency action for speed restrictions for right whales for the 2006 season. (**MOTION**) This motion was seconded by Mason Weinrich.

- ***MOTION to recommend the SBNMS consult with appropriate agencies (NMFS/USCG) to examine the options to take emergency action for speed restrictions for right whales for the 2006 season.***

Discussion: The motion was discussed by Mason Weinrich, Steve Milliken, Regina Asmutis-Silvia, Barry Gibson, William Adler, Peter Borrelli, Ed Barrett, Martin McCabe, Dale Brown, and Craig MacDonald.

Some SAC members noted that they had witnessed vessels well within the 500 yard ‘no approach zone’ guideline. This becomes more of an issue, especially given that right whales have been on Stellwagen Bank over the summer during the past few years. Some members agreed, but suggested that small vessels were not the issue, but rather large commercial ships caused the ship strike deaths. It was noted that the strike problem is widespread, ranging from Maine to Georgia. There was some suggestion that a program could be used to coordinate the efforts of the sanctuaries off the US East Coast.

Other members were in favor of efforts to help the whales but were against the sanctuary being able to create an emergency rule. These members were concerned that emergency rule making would be used against other human uses such as fishing within the sanctuary. These members were also concerned that speed restrictions on large commercial shipping would create unsafe conditions for the ships themselves, while navigating in and out of Boston. It was suggested that emergency rules could not be conducted without public review. It was also noted that the motion was only to *explore* options for emergency actions and not to specifically impose a rule.

The motion was accepted by the SAC with the following voting results (See Appendix A for voting record):

- Yea: 8
- Nay: 2
- Abstain: 3

V. Presentations

Booms, Busts and Sliding Baselines in Maine’s Coastal Ecosystem: Turbulent Seas in the Wake of Overfishing (Bob Steneck, University of Maine)

Atlantic cod and other large predatory groundfish were dominant predators in nearshore marine habitats in the Gulf of Maine for over 4000 years. Through the 1029s, they were harvested primarily by hook and line. In the 1930s, otter trawls and other technological improvements allowed for the efficient harvesting of spawning stocks; by the end of the 1940s, groundfish stocks in coastal zones were depleted. Today large predatory finfish are functionally absent from vast regions of the Gulf of Maine.

This loss of the top trophic level for benthic systems may have fundamentally altered food webs with lobsters, crabs and sea urchins increasing their abundance in coastal zones to hyperabundances at some times and in some places. Such hyperabundance of sea urchins contributed to periodic epizootic diseases and mass mortalities that result in alternating appearance and disappearance of kelp forests.

Such large-scale fisheries-induced changes have continued with the sequential targeting of species at lower trophic levels.

The recently developed industry for herbivorous sea urchins has caused significant declines in their abundance and has resulted in increases kelp and other macroalgae. This macroalgae is an excellent habitat for settling crabs that eat settling sea urchin larvae. The crab consumption is so complete that none of the settling sea urchins survive to be one year old. Jonah crabs have become a new and unprecedented apex predator. Without sea urchin herbivores, the crab-filled algal beds are a new alternate stable-state. Thus these cascading changes, to both the structure and function of the Gulf of Maine ecosystem, may make predictions difficult or impossible. While shallow coastal zones are most accessible and easy to study, similar changes have probably occurred throughout the region including Stellwagen Bank.

{Published studies in support of Steneck's abstract can be found in the following papers and most can be obtained from him (See Appendix B).}

Questions & Answers

Question 1: Ed Barrett asked that since the Sustainable Fisheries Act mandates management of top level species, how does this relate to the conclusions?

Answer: Steneck answered that a number of species impact an ecosystem. There are ecosystem 'drivers' and ecosystem 'passengers'. We still need a better sense of how the system is changing.

Question 2: Chris Kellogg asked that given multi-decadal changes, groundfish numbers and age distribution looked better within recent years. Would using recent NOAA Fisheries cruise data impact conclusions?

Answer: Steneck answered that he was uncertain how relevant such data would be for cod in the coastal zone of Maine. The baseline has slid so far from historic level that we still have far to go. Spawning aggregations need protection. This may be a particular problem for cod, and we need a better spatial sense.

Question 3: Ed Barrett asked that if large fish prey on large lobsters, why is the lobster industry pushing to bring cod stocks back in Maine coastal waters?

Answer: Steneck answered that the lobstermen are pushing to bring groundfish back so the fishery can be expanded. They want to expand the sector. The lobster fishery has been managed well and now there is a push to have more of a mosaic.

Comment: Ed Barrett commented that with the economic pie chart, lobstering is on the rise and providing large amounts of money. Folks are not fishing cod because there is so much money in lobster fishing. On the south shore of MA, cod and stripe bass have come back and lobstermen are complaining that lobster populations have been reduced. Lobstermen can't change over to groundfishing. Fishermen have been managed into a box. Now they don't have the history of groundfishing and will not be able to get a permit.

Question 4: Barry Gibson asked if there was a specific reason or episode that caused the population decline in cod?

Answer: Steneck answered that over time, spawning aggregations have been fished. These aggregations became targets. It is believed that this had impact. This could become a problem if cod exhibit more complex behavior than originally thought and are not aggregating to spawn.

Question 5: Mason Weinrich stated that there are a number of things that drive landings. In this presentation, landings are used as ecological indicators. Is there research to back this up? Also, we

have had long-term changes affecting the food chain for the coastal system. How much have we lost from the chain?

Answer: Steneck answered that there are a number of studies/surveys that he conducted to look at how landings relate to populations. The data can be provided. As for the changes to the food chain, cod are generalists. There is only one herbivore — the urchin. The number of species for each functional group is small. We have lost redundancy in the system.

Question 6: John Williamson asked if, as progress is being made, we would be able to know progress when we see it? What is progress at the ecosystem scale?

Answer: Steneck answered that ecosystem structure is driven by its process. Population density and size structure could be looked at. Perhaps we are making progress but not going far enough towards ecosystem functionality. We only have a three-tiered system in the coastal zone of Maine. I would like to see biological diversity and economic diversity more spread out.

Question 7: Craig MacDonald stated that with the Sanctuary Vision, there is a need to have a fully restored ecological integrity of the sanctuary. The targets and metrics you've provided seem simple. He is struck by the difference in goals for the sanctuary to restore ecological integrity and the NOAA Fisheries goal of restoring fishable stocks. How useful do you think slot limits could be for restoring ecological integrity within the sanctuary?

Answer: Steneck answered that there is a need to think in larger boxes —there would need to be some sort of spatial component included. One could look at the Gulf of Maine as a whole, but the coastal zone patterns are different.. Globally, large fish are economically more important than small fish. Fishing is not like predation. Predators go after smaller fish while fishing targets larger fish. The lobster industry is a slot fishery and there is greater stability in the lobster populations. He noted that slot limits provide more stability and ecological integrity.

Question 8: Mason Weinrich asked that given ecological integrity, one must look at climate change. Has climate change been looked at with this study?

Answer: Steneck answered that with chronologies like this, one would expect to see it as being climate driven. However, he stated that we are not seeing that with this. There have been declines in places like George's Bank, and there is a climate signal there. He noted that more folks are eating cod as time goes on.

Estimating Historic Abundances: A Case Study of Cod on the Scotian Shelf (Andrew Cooper, University of New Hampshire)

Historical research methods and population modeling were combined to estimate the biomass of cod on Canada's Scotian Shelf in 1852. Mid 19th-century New England fishing logs offer geographically specific daily catch records, describing fleet activity on fishing grounds with negligible incentive to falsify records. Combined with ancillary fishery documents, these logs provide a solid, reliable basis for stock assessment. Based on these data, we estimate a biomass for cod of 1.26 million metric ton (mt) in 1852, compared with less than 50,000 mt of total biomass today.

In the current policy debate about rebuilding depleted fisheries and restoring marine ecosystems, it is important to recognize that fisheries for key commercial species like cod were far more productive in the past. As we attempt to rebuild these fisheries, our decisions should reflect real and realistic goals for management, not just recently observed catch levels. Due to the difficulties of obtaining and analyzing historical data, actually specifying ecosystem-level rebuilding targets may be as much art as science.

Questions & Answers

Question 1: John Williamson stated that stock assessments had been done for all groundfish stocks. Stock recruitment trends were used to estimate Biomass at Sustainable Yield (BMSY) and the carrying capacity. Has this type of exercise been done?

Answer: Cooper answered that Myers 2001 did that sort of exercise using present stock recruitment data.

Question 2: Mason Weinrich asked why logbooks from Beverly, MA were used and not some other port? Is there a bias or did the Beverly fishermen fish the same areas as other ports? Mason also asked if, with Catch Per Unit Effort (CPUE) vs. seasonality, there was a seasonal size difference? Finally, were any modern genetic techniques used to verify the data?

Answer: Cooper answered that they found the logs in Beverly, MA. Most of the logbooks from that time were submitted to the Customs House and subsequently, were lost in a fire. With the log reports, spoken vessels (vessels that captains spoke with out to sea) were from other ports, so the Beverly fishermen were fishing in the same areas as other fishermen. For the question concerning age structure, no age structure was used for this analysis. Andy was not aware if any modern genetic techniques were used.

Question 3: John Williamson asked why boats went all the way to the Scotian Shelf given the fact that there was such a large biomass of fish?

Answer: Cooper answered that there was an inshore fishery. The logs used were from the off shore fishery and they didn't have any logbooks from the inshore fishery.

Comment: MacDonald commented that the two presentations show cod as an apex in the Gulf of Maine based on biomass. Overtime, this biomass has been reduced, also showing a reduction in overall size of individual fish. Predator size is important to the predation and survival of lobsters. There has been an ecosystem shift with the survival of prey. If true, with the Z WG, groundfish, particularly cod, is key when trying to restore ecological integrity.

Comment: Ed Barrett commented that given cod's transitory nature with the sanctuary, that cod would not necessarily be key to ecological integrity. There are times when lots of cod are on the bank and other times when they are scarce. Tagging studies have shown this. Bluefin tuna are similar in that they travel through the sanctuary. Perhaps they could be used as some benchmark, but the sanctuary is only a small piece of the overall Gulf of Maine.

Comment: Steneck suggested that there has been evidence that cod follow thermal gradients, and that cod may not actually be moving laterally, but up and down the water column.

Comment: MacDonald mentioned that acoustic tagging studies done within the sanctuary have shown that some cod show site fidelity. Cod behave differently and may not be moving on and off shore.

Comment: Steve Milliken stated that with the movement of cod, one should think about breeding locations. Cod could be moving to and from areas for breeding and such locations are important.

Question 4: Mason Weinrich stated that there is no question that cod biomass and size has been reduced over time, but is there anything that shows that other fish are not prevalent?

Answer: Steneck answered that cod and haddock bones are very similar, so some data could have been lumped together. Even dogfish show up in the historic record.

Comment: Peter Borrelli commented that cod is an important species and drove the local economy. We are struggling with metrics and identifying ecological integrity. We need key species and should define them, but we also need broad ecosystem metrics. It is a problem to manage the area given the

temporal and spatial changes of the area. Do we start managing one species at a time? There is no question that the area must be restored, but we don't know what time to restore to. No one will agree on what a pristine state was.

Comment: Chris Kellogg stated that when affecting mortality levels there is an affect on age structure. There is something else needed than just changing to something like a slot size limit. A scientific body is needed to tackle these questions. When the New England Fishery Management Council is looking at stocks there is a well defined stock assessment process that looks at science. Scientific questions need to be directed to some sort of scientific body.

Comment: John Williamson commented that the SAC may not be a science body but it represented mainstream social values. Given our personal short timescale of our lifetime, population pressure in the region has had an affect on the environment which has mostly been negative. As keepers of values, we are drawing a line to stop and hopefully reverse negative trends, making the area robust and stable.

Question 5: Dale Brown asked what other research was being funded by the sanctuary that was similar to this one?

Answer: Cooper answered that they were looking into historic datasets. The study is over a three-year period. The first year was to identify potential sources; the second year was to actually recover the data; and, the third year is to figure out exactly what can be done with the data. Weekly landings data has been identified from Middle and Tillies Banks. It's possible that this data can be compared to NOAA Fisheries surveys. Unfortunately, data was not quantified well during those survey cruises. They were simply looking for new species.

Comment: MacDonald stated that in the past, before Cape Cod was built up, the data shows large amounts of anadromous fish — shad, herring and Atlantic salmon. . Landings even showed broad-billed swordfish. Historically, this resulted in tons of forage around Stellwagen Bank. Today only a relic remainsThe data is a window of “once was” and the information is invaluable. What is done with it is up to the SAC.

Comment: Weinrich commented that the effort is important. However, the SAC is dealing with an area that has changed and can only do so many things. Restoring to what was, considering so much change has occurred, could be impossible.

Comment: Kathi Rodrigues stated that those around the table were having very similar concerns, but she views indicators differently. There is nothing wrong in looking at changes in size, but setting a certain size structure within the sanctuary is fraught with peril. It is romantic to think about “what was”; instead, we must focus on what we can do, given the situation.

Comment: Barrett cautioned that “what was” and “where we want to go” in the future must be kept in the proper context. We do not have to look so far back. Short steps toward making the area better may be more effective and will not alienate those with a stake in the area. This will have a better chance of making improvement. We need goals that we all want to work toward.

Comment: Peter Borrelli commented that the sanctuary is actually owned by lots of people: the public. The SAC needs to be prepared for all expectations when the Management Plan is released for public comment. At that time, the public will weigh in and will set what the sanctuary ought to be. We will then have to do our best with the tools at our disposal. It is important to remember that there is a larger audience.

VI. SAC Chair and Coordinator's Annual Meeting, Washington D.C.

SAC Chair and Coordinator's Meeting

The Annual SAC Chair and Coordinator's Meeting will be held in Washington, D.C. the week of 24 April 2006. John Williamson and Nathalie Ward will be attending. This year, the chairs were asked to provide input on specific issues including anthropogenic noise and NOAA's policy for regulating fisheries within sanctuaries. Regarding these issues, Nathalie prepared summaries (and various documents) and sent to the SAC in advance of this meeting.

Williamson noted that it was his intention to have a full understanding of these issues prior to the 24 April meeting. Also, asked the SAC if there were other issues that the SAC would like to present in D.C. that have 'commonality' throughout multiple sanctuaries.

Williamson stated that a conference call has been scheduled for SAC Chairs January 31, 2006 with the Deputy Assistant Secretary for NOS and NOAA Fisheries. This call is to elucidate the process that the sanctuary must undergo (in relation to the NMSA) regarding establishment of fisheries regulations within the sanctuary. NOAA is putting its seal of approval on the current process.

In response, SAC members suggested that other sanctuaries, specifically the Channel Islands, may be dealing with LNG issues. LNG should be brought up as a topic at the Chair/Coordinator's meeting. Also, members suggested that another cross-cutting topic is how sanctuaries are dealing with *restoration activities* and how they are dealing with '*ecological integrity*'. Williamson will report at the next SAC meeting.

VII. New Business (John Williamson)

Wreck Diving on SBNMS

The Marine Heritage Resources WG had a number of divers present. Some of the technical diving public are voicing discontent with having no access to wrecks within the sanctuary. They are voicing their concerns through articles, interviews and the internet. The sanctuary is currently responding to their concerns by providing information to these media sources. NOAA will be providing a letter to use as an editorial for publications. Headquarters is also dealing with multiple requests for disclosure of all wreck sites within the SBNMS.

Preserve America City (Gloucester, MA)

A new federal grant opportunity has been developed for historic cities across the country. Cities can submit to become a Preserve America City. Funding will enable a city to conduct community development and set up tourist programs. Gloucester has been selected as a Preserve America City. John Williamson suggested that other key cities around the sanctuary should be submitted for selection as a Preserve America City.

Hydrophones and Cornell University

Craig MacDonald announced that a new program was underway to place hydrophones in locations throughout the sanctuary to monitor noise. This program is being conducted in conjunction with Cornell University. A Post-doctoral researcher, Leila Hatch, will be working with the sanctuary on this project.

VIII. Public Comment

No public comment given.

IX. 18th SAC Meeting Adjourned

The 18th SAC Meeting was adjourned at 4:20 PM

SUMMARY of MOTIONS

24 January 2006

- *MOTION to recommend the SBNMS consult with appropriate agencies (NMFS/USCG) to examine the options to take emergency action for speed restrictions for right whales for the 2006 season.*

APPENDIX A

SAC Voting Record, January 24, 2006

SBNMS SAC Action Plan Review Voting Sheet

MOTION to recommend the SBNMS consult with appropriate agencies (NMFS/USCG) to examine the options to take emergency action for speed restrictions for right whales for the 2006 season.

Last	First	SAC Designation	Yea	Nay	Abstain
Adler	William	SAC Member		X	
Asmutis-Silvia	Regina	SAC Alternate	X		
Auster	Peter	SAC Member	Absent		
Barrett	Edward	SAC Member			X
Borrelli	Peter	SAC Member	X		
Brooks	Priscilla	SAC Member	X		
Brown	Dale	SAC Alternate	X		
Cramer	Deborah	SAC Member	Absent		
Gibson	Barry	SAC Member	X		
McCabe	Martin	SAC Alternate		X	
Milliken	Steve	SAC Member			X
Tucker	Steven	SAC Alternate	X		
Weinrich	Mason	SAC Member	X		
Wheeler	Richard	SAC Member	X		
Williamson	John	SAC Member			X
Yozell	Sally	SAC Member	Absent		

Totals:

8

2

3

APPENDIX B

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